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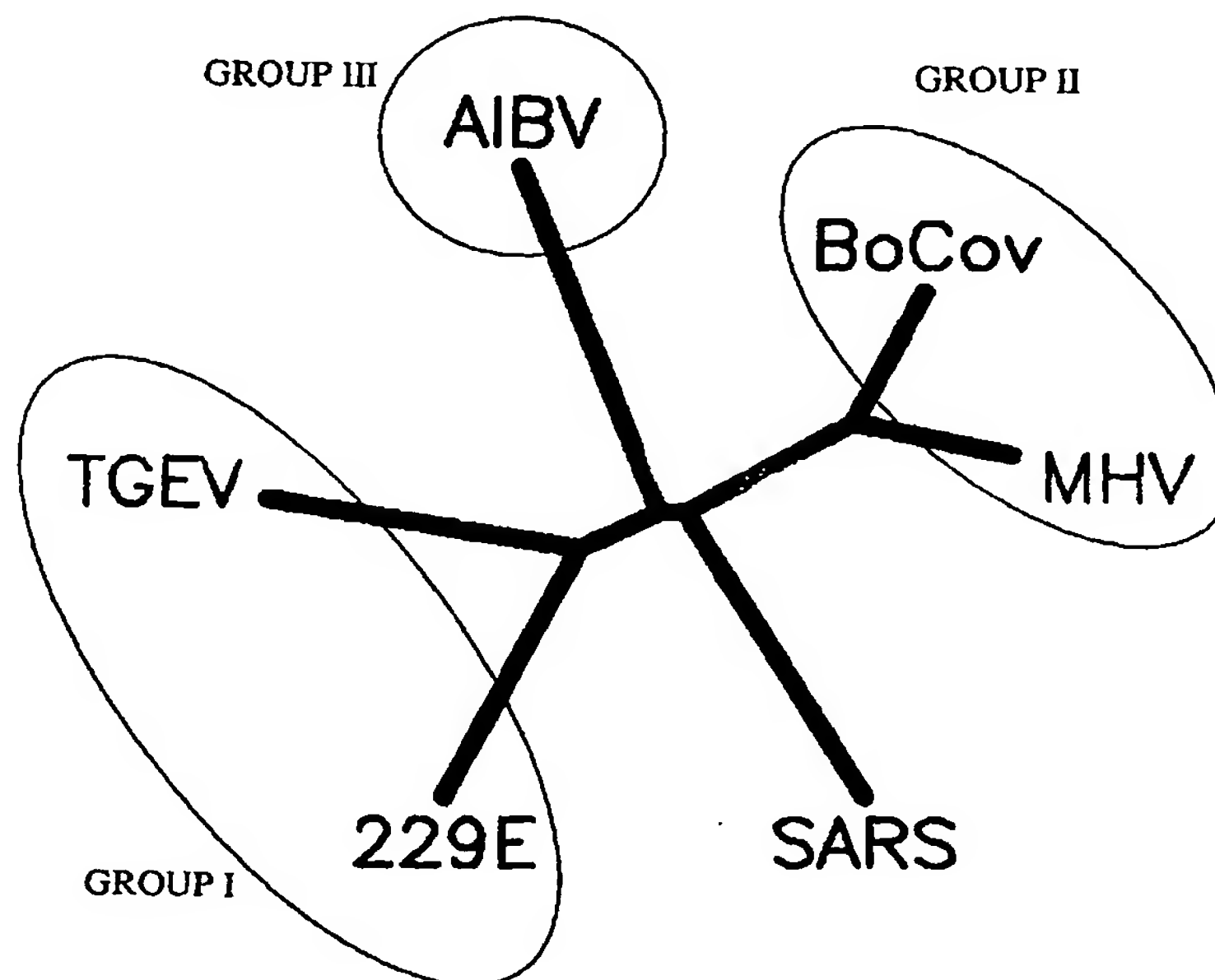
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[Continued on next page]

(54) Title: SARS VIRUS NUCLEOTIDE AND AMINO ACID SEQUENCES AND USES THEREOF

### Replicase 1A



(57) Abstract: The invention provides, in part, the genomic sequence of a putative coronavirus, the SARS virus, and provides novel nucleic acid and amino acid sequences that may be used, for example, for the diagnosis, prophylaxis, or therapy of a variety of SARS virus related disorders.

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# INTERNATIONAL SEARCH REPORT

International Application No  
PCT/CA2004/000626

## A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 C07K14/165 C12N15/11 A61K39/215

According to International Patent Classification (IPC) or to both national classification and IPC

## B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 C07K C12N A61K

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, EMBASE, BIOSIS, WPI Data, PAJ

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	DATABASE GENBANK 'Online! 25 April 2003 (2003-04-25), "SARS coronavirus, complete genome" XP002294214 retrieved from NCBI Database accession no. NC_004718 'gi:29826277! abstract	1-64
X	----- DATABASE GENBANK 'Online! 9 April 2003 (2003-04-09), "SARS coronavirus, complete genome" XP002294215 retrieved from NCBI Database accession no. NC_004718 'gi:30124072! abstract ----- -/--	1-64

☒ Further documents are listed in the continuation of box C.

☐ Patent family members are listed in annex.

### \* Special categories of cited documents :

- \*A\* document defining the general state of the art which is not considered to be of particular relevance
- \*E\* earlier document but published on or after the international filing date
- \*L\* document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
- \*O\* document referring to an oral disclosure, use, exhibition or other means
- \*P\* document published prior to the international filing date but later than the priority date claimed

- \*T\* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
- \*X\* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
- \*Y\* document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.
- \*&\* document member of the same patent family

Date of the actual completion of the international search

30 August 2004

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# INTERNATIONAL SEARCH REPORT

International Application No  
PCT/CA2004/000626

## C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	<p>DATABASE GENBANK 'Online! 25 April 2003 (2003-04-25), "SARS coronavirus, complete genome" XP002294216 retrieved from NCBI Database accession no. NC_004718 'gi:30271926! abstract</p>	1-64
A	<p>----- DATABASE GENBANK 'Online! 21 April 2003 (2003-04-21), "SARS coronavirus Urbani" XP002294217 retrieved from NCBI Database accession no. AY278741 'gi:30027617! abstract</p>	
A	<p>----- DATABASE GENBANK 'Online! 21 April 2003 (2003-04-21), "SARS coronavirus CUHK-W1" XP002294245 retrieved from NCBI Database accession no. AY278554 'gi:30027610! abstract</p>	
P, X	<p>----- ROTA P A ET AL: "Characterization of a novel coronavirus associated with severe acute respiratory syndrome" SCIENCE, AMERICAN ASSOCIATION FOR THE ADVANCEMENT OF SCIENCE,, US, vol. 300, no. 5624, 30 May 2003 (2003-05-30), pages 1394-1399, XP002269482 ISSN: 0036-8075 the whole document</p>	1-64
P, X	<p>----- MARRA M A ET AL: "The Genome sequence of the SARS-associated coronavirus" SCIENCE, AMERICAN ASSOCIATION FOR THE ADVANCEMENT OF SCIENCE,, US, vol. 300, no. 5624, 30 May 2003 (2003-05-30), pages 1399-1404, XP002276584 ISSN: 0036-8075 the whole document</p> <p style="text-align: center;">-----</p>	1-64

# INTERNATIONAL SEARCH REPORT

International application No.  
PCT/CA2004/000626

## Box II Observations where certain claims were found unsearchable (Continuation of item 2 of first sheet)

This International Search Report has not been established in respect of certain claims under Article 17(2)(a) for the following reasons:

1. ☒ Claims Nos.: 65-66  
because they relate to subject matter not required to be searched by this Authority, namely:  
Although claims 56-61 are directed to a method of treatment of the human/animal body, the search has been carried out and based on the alleged effects of the compound/composition.
2. ☒ Claims Nos.: 3 in part  
because they relate to parts of the International Application that do not comply with the prescribed requirements to such an extent that no meaningful International Search can be carried out, specifically:  
see FURTHER INFORMATION sheet PCT/ISA/210
3. ☐ Claims Nos.:  
because they are dependent claims and are not drafted in accordance with the second and third sentences of Rule 6.4(a).

## Box III Observations where unity of invention is lacking (Continuation of item 3 of first sheet)

This International Searching Authority found multiple inventions in this international application, as follows:

see additional sheet

1. ☐ As all required additional search fees were timely paid by the applicant, this International Search Report covers all searchable claims.
2. ☐ As all searchable claims could be searched without effort justifying an additional fee, this Authority did not invite payment of any additional fee.
3. ☐ As only some of the required additional search fees were timely paid by the applicant, this International Search Report covers only those claims for which fees were paid, specifically claims Nos.:
4. ☒ No required additional search fees were timely paid by the applicant. Consequently, this International Search Report is restricted to the invention first mentioned in the claims; it is covered by claims Nos.:  
1-5; 6-64 (in part)

Remark on Protest

- ☐ The additional search fees were accompanied by the applicant's protest.
- ☐ No protest accompanied the payment of additional search fees.

## FURTHER INFORMATION CONTINUED FROM PCT/ISA/ 210

## Continuation of Box II.1

Although claims 56-61 are directed to a method of treatment of the human/animal body, the search has been carried out and based on the alleged effects of the compound/composition.

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## Continuation of Box II.1

Claims Nos.: 65-66

The subject-matter of claims 65 and 66 relate only to the presentation of structural information and is not regarded as an patentable invention within the meaning of Rule 39.1(v) PCT. This information is disclosed as nucleic acid / amino acid sequences and stored in the form of computer readable records.

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## Continuation of Box II.2

Claims Nos.: 3 in part

The Sequence Listing as originally filed does not comprise Seq. Id. No. designators 208, 209. Reference to these Seq.Id.Nos is unclear.

The applicant's attention is drawn to the fact that claims relating to inventions in respect of which no international search report has been established need not be the subject of an international preliminary examination (Rule 66.1(e) PCT). The applicant is advised that the EPO policy when acting as an International Preliminary Examining Authority is normally not to carry out a preliminary examination on matter which has not been searched. This is the case irrespective of whether or not the claims are amended following receipt of the search report or during any Chapter II procedure. If the application proceeds into the regional phase before the EPO, the applicant is reminded that a search may be carried out during examination before the EPO (see EPO Guideline C-VI, 8.5), should the problems which led to the Article 17(2) declaration be overcome.